

Natural Communities of Louisiana



Eastern Upland Longleaf Pine Forest

Rarity Rank: S1S2/G1G2 Synonyms: Sandhill Pine Forest

Ecological Systems:

CES203.496 East Gulf Coastal Plain Interior Upland Longleaf Pine Woodland

General Description:

- Occurs hilly uplands with acidic loamy sands to acid clays associated with Pleistocene terraces
- Characteristically dissected by small to large branch or creek bottoms
- Pinus palustris (longleaf pine) is the dominant overstory species, and in locations where fire has frequently occurred, it is often the only canopy species
- Highly diverse herbaceous flora
- Fire maintained natural community (frequent fires prevent woody encroachment and maintain herbaceous layer)



Common woody species include:

Pinus palustris (longleaf pine), Nyssa sylvatica (black gum), Q. stellata (post oak), Sassafras albidum (sassfras)

Common midstory & understory species include:

Cornus florida (flowering dogwood),
V. stamineum (deer berry),
Gaylussacia dumosa (dwarf huckleberry),
Morella cerifera (wax myrtle),
Ilex vomitoria (yaupon),
Rhus copallina (winged sumac),
Parthenocissus quinquefolia (Virginia creeper),
Gelsemium sempervirens (yellow jessamine),

Common herbaceous species include:

Andropogon spp. (broomsedges),
Aristida (three-awn grasses),
Panicum (panic grasses),
Ctenium aromaticum (toothache grass),
Eragrostis (love grasses),
Gymnopogon (skeleton grasses),
Paspalum (paspy grasses),

P. echinata (shortleaf pine),
Quercus marilandica (blackjack oak),
Diospyros virginiana (persimmon),

Vaccinium arboreum (winter honeysuckle), V. darrowii (dwarf blueberry), Callicarpa americana (French mulberry), Sideroxylon lanuginosa (chittum-wood), Rubus spp. (blackberries), Vitis spp. (wild grape), Smilax spp. (greenbriers), Pteridium aquilinum (bracken fern)

Schizachyrium scoparium (little bluestem)
Sporobolus (dropseeds),
Anthaenantia (silky scales),
Digitaria (crab grasses),
Erianthus (plume grasses),
Muhlenbergia (muhly grasses),
Setaria spp. (bristle grasses)



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Common forb (wildflower) species include:

Eurybia spp. & Symphyotrichum spp. (asters) Chrysopsis spp. (golden asters), Elaphantopus spp. (elephant-foot), Euthamia spp. (flat-topped goldenrods),

Helenium spp. (sneeze-weeds), *Liatris* spp. (blazing-stars),

Solidago spp. (goldenrods),

Oenothera spp. (evening primroses),

Lobelia spp. (lobelias),

Ruellia spp. (wild petunias),

Asclepias spp. (mildweeds), Euphorbia spp. (spurges),

Agalinis spp. (false foxgloves),

Baptisia spp. (indigos),

Clitoria mariana (pigeon wings),

Desmodium spp. (beggar's ticks), Stylsanthes biflora (pencil-flower),

Tephrosia spp. (hoary peas)

Carphephorus odoratissimus (vanilla plant),

Heterotheca spp. (golden asters),

Eupatorium spp. (thoroughworts),

Gnaphalium spp. (rabbit tobaccos),

Helianthus spp. (sunflowers),

Rudbeckia spp. (brown-eyed susans),

Vernonia spp. (ironweeds),

Polygala spp. (milkworts),

Callirhoe papaver (poppy-mallow),

Hypoxis spp. (yellow-eyed grasses),

Lechea spp. (pinweeds),

Sabatia spp. (rose-gentians),

Rhexia spp. (meadow beauties

Centrosema virginianum (butterfly pea),

Crotolaria spp. (rattle pods),

Lespedeza spp. (bush clovers),

Rhynchosia spp. (snout beans),

Federally-listed plant & animal species:

Picoides borealis (red-cockaded woodpecker)

Gopherus polyphemus (gopher tortoise)

Endangered; G2; S2 Threatened; G3; S1

Range:

Eastern portion of the East Gulf Coastal Plain ecoregion within Louisiana

Threats & Management Considerations:

Only 1 to 5 % of the original 2 million acres of upland longleaf pine forests in southeast LA remain. Activities causing direct impacts or destruction include conversion to loblolly pine plantations, fire exclusion or inappropriate fire regime, construction of roads, pipelines or utilities, , and residential or commercial development. Other activities impacting these



forests include use of chemical herbicides or fertilizers, and introduction of invasive or exotic species.

Use of appropriate management activities and developing a compatible management plan prevents destruction or degradation of this habitat type and promotes long-term maintenance of healthy longleaf forests. Such management strategies should include:

- Use of growing season prescribed fire (April-June) at a frequency of every 1 to 3 years
- Thinning targeting loblolly and slash pines for removal and favoring longleaf pine as "leave" trees
- Replanting with longleaf seedlings only
- Preventing conversion of existing natural forests to other land uses
- Surveying for and removal of any invasive plant species (exotics or woody) with prescribed fire or use of spot herbicides or mechanical means